

**REMARKS**

Claims 17-19 and 22-28 are pending after entry of this paper. Claims 1-16, 20, and 21 have been withdrawn from consideration. Claims 17-19 and 22 have been rejected and claims 23-28 have been objected to. Claims 6-8, 11, and 13-28 have been amended.

Claims 18, 19, and 26 have been amended to correct typographical errors.

Claims 22-24 and 27-28 have been amended to place the claims in proper dependent form.

No new matter has been introduced by these amendments. Reconsideration and withdrawal of the pending rejections in view of the above claim amendments and below remarks are respectfully requested.

**Response to Objection under 37 C.F.R. §1.75(c)**

Claims 23-28 are objected to under 37 C.F.R. §1.75(c) as being in improper form because a multiple dependent claim cannot depend from another multiple dependent claim.

Accordingly, applicants have amended claims 23-27 to be in proper dependent form. Applicants request reconsideration and withdrawal of this §1.75(c) objection to claims 23-28.

**Response to Rejections under 35 U.S.C. §102**

Claims 17-19 and 22 are rejected under 35 U.S.C §102(b) as being anticipated by U.S. Patent Publication No. 2002/0156186 to Bublewitz et al. (hereinafter Bublewitz I).

Specifically, the Examiner alleges that “Bublewitz I teaches a condensation (esterification) catalyst comprising metal alkoxides such as zirconium alkoxides, hafnium alkoxides, gallium alkoxides and iron alkoxides and further teaches the use of double metal

alkoxides (paragraph 0098), which contain two different metal alkoxides in a particular ratio and would read on using both zirconium and iron alkoxides together" (Office Action, page 2).

Therefore, according to the Examiner, Bublewitz I anticipates the claimed invention. Applicants respectfully disagree.

Applicants assert that contrary to the Examiner's contention, Bublewitz I does not anticipate the claimed invention either explicitly or inherently. Bublewitz I is directed to multicomponent systems, components, mixtures and methods for making impressions (para. 0002). The embodiments of the invention of Bublewitz I include at least one condensation catalyst and/or condensation cross-linking agent (for example, para. 0046). In particular, Bublewitz I discloses an expansive list of condensation catalysts and condensation cross-linking agents with over 28 different metal alkoxides, as well as the chelates and oligo-polycondensates of the listed alkoxides, especially titanium and zirconium alkoxides (para. 0098).

As the Examiner is aware:

"In determining that quantum of prior art disclosure which is necessary to declare an applicant's invention 'not novel' or 'anticipated' within section 102, the stated test is whether a reference contains an enabling disclosure'... ." *In re Hoeksema*, 399 F.2d 269, 158 USPQ 596 (CCPA 1968). The disclosure in an assertedly anticipating reference must provide an enabling disclosure of the desired subject matter; mere naming or description of the subject matter is insufficient, if it cannot be produced without undue experimentation. *Elan Pharm., Inc. v. Mayo Found. For Med. Educ. & Research*, 346 F.3d 1051, 1054, 68 USPQ2d 1373, 1376 (Fed. Cir. 2003) (See MPEP 2121.01; emphasis added)

In fact, Bublewitz I only recites two (2) preferred variations of metal alkoxides containing either titanium or zirconium, but does not include zirconium and iron (See *Id.* para. 98). Merely listing all possible condensation catalysts and/or condensation cross-linking agents

does not provide an enabling disclosure to one skilled in the art to practice the claimed invention without an undue experimentation. In fact, without any guidance, one skilled in the art would have to perform a great deal of undue experimentation to arrive at the claimed invention.

Therefore, applicants assert that a non-specific disclosure with respect to condensation catalysts and/or condensation cross-linking agents (total of more than 28 catalysts listed by Bublewitz I) including zirconium alkoxide and iron alkoxide cannot be anticipatory of the claimed catalyst made from a composition of a zirconium (IV) compound and an iron compound. Simply because a moiety is listed as one possible choice for one position does not mean there is *ipsis verbis* support for every species or subgenus that chooses that moiety. Were this to be the case, a “laundry list” disclosure of every possible moiety for every possible position would constitute a written description of every species in the genus. *Fujikawa v. Watanasin*, 93 F.3d 1559, 39 U.S.P.Q.2d 1895, 1905 (Fed. Cir. 1996) and *In re Ruschig*, 379 F.2d 990, 995, 154 USPQ 118, 123 (CCPA 1967) as cited in MPEP 2163. In fact, one skilled in the art would have to examine at least  $2^{28}$  (268435456) possible combinations of double metal compounds in order to arrive at a claimed catalyst comprising a zirconium (IV) compound and an iron compound. Clearly, such an immense number of combinations constitutes undue experimentation.

Therefore, applicants assert that Bublewitz I does not anticipate the claimed invention because Bublewitz I does not disclose a catalyst for preparing an ester condensate, containing a zirconium (IV) compound and an iron compound as presently claimed. Reconsideration and withdrawal of the §102(b) rejection to claims 17-19 and 22 are respectfully requested.

Claims 17-19 and 22 are rejected under 35 U.S.C. §102(b) as being anticipated by U.S. Patent Publication No. 2002/0147275 to Bublewitz et al (hereinafter Bublewitz II).

Specifically, the Examiner states that:

Bublewitz I [sic] teaches a condensation (esterification) catalyst comprising metal alkoxides such as zirconium alkoxides, hafnium alkoxides, gallium alkoxides and iron alkoxides and further teaches the use of double metal alkoxides (paragraph 00921), which contain two different metal alkoxides in a particular ratio and would read on using both zirconium and iron alkoxides together. (Office Action, page 3).

Therefore, according to the Examiner, Bublewitz II anticipates the claimed invention.

Applicants respectfully disagree.

Applicants assert that contrary to the Examiner's contention, Bublewitz II does not anticipate the claimed invention either explicitly or inherently. Bublewitz II, similar to Bublewitz I, is directed to multicomponent systems, components, mixtures and methods for making impressions (para. 0001). The embodiments of the invention of Bublewitz II include at least one condensation catalyst and/or condensation cross-linking agent (for example, para. 0040). In particular, Bublewitz II discloses an expansive list of condensation catalysts and condensation cross-linking agents with over 28 different metal alkoxides, as well as the chelates and oligo-polycondensates of the listed alkoxides, especially titanium and zirconium alkoxides (para. 0092).

As noted above, the reference must have sufficient disclosure to put the public in possession of the invention, *i.e.*, must present an enabling disclosure (See MPEP 2121.01). Bublewitz II recites two (2) preferred variations of metal alkoxides containing either titanium or zirconium, but does not include zirconium and iron (See *Id.* para. 0092). Merely listing all possible condensation catalysts and/or condensation cross-linking agents does not provide an enabling disclosure to one skilled in the art to practice the claimed invention without an undue

experimentation. In fact, one skilled in the art would have to perform a great deal of undue experimentation to arrive at the claimed invention.

Therefore, applicants assert that a non-specific disclosure with respect to condensation catalysts and/or condensation cross-linking agents (total of more than 28 catalysts listed by Bublewitz II) including zirconium alkoxide and iron alkoxide cannot be anticipatory of the claimed catalyst made from a composition of a zirconium (IV) compound and an iron compound. Simply because a moiety is listed as one possible choice for one position does not mean there is *ipsis verbis* support for every species or subgenus that chooses that moiety. Were this to be the case, a “laundry list” disclosure of every possible moiety for every possible position would constitute a written description of every species in the genus (See MPEP 2163). In fact, one skilled in the art would have to examine at least  $2^{28}$  (268435456) possible combinations of double metal compounds in order to arrive at the claimed catalyst comprising a zirconium (IV) compound and an iron compound. Clearly, such an immense number of combinations constitutes undue experimentation. Therefore, applicants assert that Bublewitz II does not anticipate the claimed invention because Bublewitz II does not disclose a catalyst for preparing an ester condensate, containing a zirconium (IV) compound and an iron compound as presently claimed. Reconsideration and withdrawal of the §102(b) rejection to claims 17-19 and 22 are respectfully requested.

#### Response to Rejections under 35 U.S.C. §103

Claims 17-19 and 22 are rejected under 35 U.S.C. §103(a) as allegedly being obvious over U.S. Patent Publication No. 2002/0156186 to Bublewitz et al. (hereinafter

Bublewitz I). Specifically, the Examiner states that, in addition to the above, “a Markush group itself reads on a mixture of the recited elements and further still it is *prima facie* obvious to combine two or three compositions, each taught for the same purpose to yield a third composition for that very purpose.” (Office Action, page 4). Applicants respectfully disagree.

As argued above, Bublewitz I does not enable one of ordinary skill in the art to arrive at a composition of a zirconium (IV) compound and an iron compound as recited in instant claim 17. Regardless of the Examiner’s contention that it would have been obvious to use mixtures of recited elements to yield an additional composition, such overly broad disclosure does not enable one of ordinary skill in the art to make or use the composition of claim 17.

MPEP 2163 states while citing the Federal Circuit that simply because a moiety is listed as one possible choice for one position does not mean there is *ipsis verbis* support for every species or subgenus that chooses that moiety. Were this to be the case, a “laundry list” disclosure of every possible moiety for every possible position would constitute a written description of every species in the genus (See MPEP 2163). In fact, applicants have clearly demonstrated that one skilled in the art would have to examine at least 2<sup>28</sup> (268435456) possible combinations of double metal compounds in order to arrive at a claimed catalyst comprising a zirconium (IV) compound and an iron compound. Clearly, such an immense number of combinations constitute undue experimentation.

Applicants respectfully request reconsideration and withdrawal of this §103(a) obviousness rejection to claims 17-19 and 22.

Claims 17-19 and 22 are rejected under U.S.C §103(a) as allegedly being obvious over U.S. Patent Publication No. 2002/0147275 to Bublewitz et al (hereinafter Bublewitz II).

Specifically, the Examiner states that, in addition to the above, “a Markush group itself reads on a mixture of the recited elements and further still it is *prima facie* obvious to combine two or three compositions, each taught for the same purpose to yield a third composition for that very purpose.” (Office Action, page 5). Applicants respectfully disagree.

As argued above, Bublewitz II does not enable one of ordinary skill in the art to arrive at a composition of a zirconium (IV) compound and an iron compound as recited in instant claim 17. Regardless of the Examiner’s contention that it would have been obvious to use mixtures of recited elements to yield an additional composition, this overly broad disclosure does not enable one of ordinary skill in the art to make or use the composition of claim 17.

MPEP 2163 states while citing the Federal Circuit that simply because a moiety is listed as one possible choice for one position does not mean there is *ipsis verbis* support for every species or subgenus that chooses that moiety. Were this to be the case, a “laundry list” disclosure of every possible moiety for every possible position would constitute a written description of every species in the genus (See MPEP 2163). In fact, applicants have clearly demonstrated that one skilled in the art would have to examine at least  $2^{28}$  (268435456) possible combinations of double metal compounds in order to arrive at the claimed catalyst comprising a zirconium (IV) compound and an iron compound. Clearly, such an immense number of combinations constitutes undue experimentation.

Applicants respectfully request reconsideration and withdrawal of this §103(a) obviousness rejection to claims 17-19 and 22.

Claims 17-19 and 22 are rejected under 35 U.S.C § 103(a) as being allegedly obvious over U.S. Patent Publication No. 2002/0045545 to Oki, et al. Specifically, the Examiner contends that

Oki teaches a catalyst comprising metal alkoxides such as zirconium alkoxides and iron alkoxides (paragraph 00045). Furthermore, a Markush group itself reads on a mixture of the recited elements and further still it is *prima facie* obvious to combine two or three compositions, each taught for the same purpose to yield a third composition for that very purpose. (Office Action, page 5)

Thus, according to the Examiner, the claimed invention is made obvious over Oki. Applicants respectfully disagree.

Applicants assert that contrary to the Examiner's contention, Oki does not make obvious the claimed invention. Oki discloses a porous titania, a catalyst comprising the porous titania, a method of producing the porous titania, and a method for the catalyst comprising porous titania (par. 0002). In particular, Oki discloses an expansive list of catalysts with over 13 different metals alkoxides, as well as the ketonates and chlorides of the listed alkoxides (par. 0045).

Despite this expansive disclosure, Oki does not describe a composition of a zirconium (IV) compound and an iron compound. In fact, only titanium and vanadium metal compounds are specified beyond the laundry list of possible metal catalysts. As noted above, the reference must have sufficient disclosure to put the public in possession of the invention, *i.e.*, must present an enabling disclosure. Merely listing all possible condensation catalysts does not provide an enabling disclosure to one skilled in the art to practice the claimed invention without undue experimentation. In fact, one skilled in the art would have to perform a great deal of undue experimentation to arrive at the claimed invention.

Thus, regardless of the Examiner's contention that it would have been obvious to use mixtures of recited elements to yield an additional composition, this overly broad disclosure does not enable one of ordinary skill in the art to make or use the composition of claim 17.

MPEP 2163 states while citing the Federal Circuit that simply because a moiety is listed as one possible choice for one position does not mean there is *ipsis verbis* support for every species or subgenus that chooses that moiety. Were this the case, a "laundry list" disclosure of every possible moiety for every possible position would constitute a written description of every species in the genus (See MPEP 2163). In fact, one skilled in the art would have to examine at least  $2^{13}$  (8192) possible combinations of double metal alkoxides in order to arrive at the claimed catalyst comprising a zirconium (IV) compound and an iron compound. Clearly, such an immense number of combinations constitutes undue experimentation.

Applicants respectfully request reconsideration and withdrawal of this §103(a) rejection to claims 17-19 and 22.

#### Dependent Claims

The applicants have not independently addressed all of the rejections of the dependent claims. The applicants submit that for at least similar reasons as to why independent claim 17 from which all of the dependent claims 18, 19, and 22-28 depend are believed allowable as discussed *supra*, the dependent claims are also allowable. The applicants however, reserve the right to address any individual rejections of the dependent claims and present independent bases for allowance for the dependent claims should such be necessary or appropriate.

**CONCLUSION**

Based on the foregoing amendments and remarks, the applicants respectfully request allowance of this application.

**AUTHORIZATION**

The Commissioner is hereby authorized to charge any additional fees which may be required for consideration of this Amendment to Deposit Account No. **13-4500**, Order No. 4439-4041.

In the event that an extension of time is required, or which may be required in addition to that requested in a petition for an extension of time, the Commissioner is requested to grant a petition for that extension of time which is required to make this response timely and is hereby authorized to charge any fee for such an extension of time or credit any overpayment for an extension of time to Deposit Account No. **13-4500**, Order No. 4439-4041.

Respectfully submitted,  
MORGAN & FINNEGAN, L.L.P.

Dated: April 30, 2008

By:

  
Serge Ilin-Schneider  
Registration No. 61,584

**Correspondence Address:**

MORGAN & FINNEGAN, L.L.P.  
3 World Financial Center  
New York, NY 10281-2101

(212) 415-8700      Telephone  
(212) 415-8701      Facsimile